

**REMARKS**

Applicants and their Attorney gratefully acknowledge the telephonic interviews conducted with the Examiner on January 10, 2007, January 12, 2007, and January 17, 2007.

Claims 1 and 3-21 were pending in the application. Claims 1, 4-7, 9, and 10 have been amended. Accordingly, upon entry of the present amendment, claims 1 and 3-21 will remain pending in the application.

Support for the amendments to the claims may be found throughout the specification and claims as originally filed. *No new matter has been added.*

Any amendments to and/or cancellation of the claims are not to be construed as an acquiescence to any of the rejections set forth in the instant Office Action, and were done solely to expedite prosecution of the application. Applicants hereby reserve the right to pursue the subject matter of the claims as originally filed in this or a separate application(s).

***Withdrawal of Certain Objections/Rejections***

Applicants gratefully acknowledge the Examiner's indication that the following objections/rejections have been withdrawn:

- (a) the previous rejection of claim 1 under 35 U.S.C. §112, second paragraph as being indefinite for the recitation of "desired DNA unit" in step c) and the recitation of "each subsequent desired DNA unit" in step e);
- (b) the previous rejection of claim 4 under 35 U.S.C. §112, second paragraph as being indefinite for the recitation of "desired DNA unit" in step c);
- (c) the previous rejection of claim 8 under 35 U.S.C. §112, second paragraph as being indefinite for the recitation of "the DNA modification";
- (d) the previous rejection of claim 9 under 35 U.S.C. §112, second paragraph as being indefinite for the recitation of "each subsequent desired DNA unit" in step e);
- (e) the previous rejection of claim 9 under 35 U.S.C. §112, second paragraph as being indefinite for the recitation of "other desired DNA unit" in step a);

- (f) the previous rejection of claims 9 and 10, under 35 U.S.C. §112, second paragraph as being indefinite for the recitation of the phrases “ligated product” in step d) and “the desired DNA unit” in step d); and
- (g) the previous rejection of claims 9 and 10, under 35 U.S.C. §112, second paragraph as being indefinite for the recitation of “each desired DNA in step e”.

***Objections to the Claims***

The Examiner has objected to claims 9 and 10, because, according to the Examiner, “said starting DNA construct’ should be ‘cleaved starting DNA construct’”. While in no way acquiescing to the validity of the Examiner’s objection and solely in the interest of expediting prosecution, Applicants have amended claims 9 and 10, thereby rendering the foregoing objection moot. Accordingly, Applicants respectfully request that this objection to claims 9 and 10 be reconsidered and withdrawn.

***Rejections of Claims 1-17 and 21 Under 35 U.S.C. §112, Second Paragraph***

The Examiner has rejected claims 1-17 and 21 under 35 U.S.C. §112, second paragraph as allegedly “being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.”

With respect to claim 1, the Examiner is of the opinion that claim 1 is “vague and indefinite” because

[s]ince step a/ does not indicate that after cleaving each desired DNA unit with said restriction enzyme, a first desired DNA unit in step c) contains said DNA methylase recognition sequence that is compatible with such a restriction enzyme recognition sequence, it is unclear how to bring the ligated product into contact with a DNA methylase enzyme such that the restriction site at the 3’ end of the first desired DNA unit in the ligated product is abolished and thereby generating a ligated product containing a DNA modification as recited in step c) of claim 1.

Applicants respectfully submit that, in view of the amendments to claim 1, the foregoing rejection has been rendered moot. Accordingly, Applicants respectfully request that this rejection of claim 1 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

With respect to claim 1, the Examiner is further of the opinion that

it is unclear that an accessible unmodified recognition site for said restriction enzyme in step d) is identical to the restriction site at the 5' end of the first desired DNA unit or not. If an accessible unmodified recognition site for said restriction enzyme in step d) is not identical to the restriction site at the 5' end of the first desired DNA unit, it is unclear how the ligated product and the ligated product containing a DNA modification can contain another accessible unmodified recognition site for said restriction enzyme.

Applicants respectfully submit that, in view of the amendments to claim 1, the foregoing rejection has been rendered moot. Accordingly, Applicants respectfully request that the rejection of claim 1 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

The Examiner is further of the opinion that claim 1 “is vague and indefinite”

[s]ince, in view of steps c) to e), the DNA constructs used for ligating each desired DNA unit in step e) must be different while step c) requires to use the same DNA construct for ligating each desired DNA unit, it is unclear how to generate a DNA construct containing all the desired DNA units in sequence using the same DNA construct.

Applicants respectfully submit that, in view of the amendments to claim 1, the foregoing rejection has been rendered moot. Accordingly, Applicants respectfully request that this rejection of claim 1 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

With respect to claim 4, the Examiner is of the opinion that claim 4 is “vague and indefinite” because

it is unclear that an accessible *Xba*I site in step d) is identical to [the] *Xba*I site at the 5' end of the ligation product recite in step c) or not. If an accessible *Xba*I site in step d) is not identical to [the] *Xba*I site at the 5' end of the ligation product recited in step c), it is unclear how the ligated product can contain an accessible *Xba*I site.

Applicants respectfully submit that, in view of the amendments to claim 4, the foregoing rejection has been rendered moot. Accordingly, Applicants respectfully request that this rejection of claim 4 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

The Examiner is further of the opinion that claim 4 "is vague and indefinite"

[s]ince [the] *Xba*I site at [the] 3' end of the ligated product in step c) is abolished by transforming the ligated product into a *dam*<sup>+</sup> strain of *E. coli* (for *dam* methylase recognition site, see 2002-03 New England Biolabs Catalog, page 98), [the] ligated product in step d) is different from the ligated product in step c) and the phrase "the ligated product" in step d) is improper.

Applicants respectfully submit that, in view of the amendments to claim 4, the foregoing rejection has been rendered moot. Accordingly, Applicants respectfully request that this rejection of claim 4 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

The Examiner is further of the opinion that claim 4 "is vague and indefinite"

[s]ince, in view of steps c) to e), the DNA constructs used for ligating each desired DNA unit in step e) must be different while step c) requires to use the same DNA construct for ligating each desired DNA unit, it is unclear how to generate a DNA construct containing all the desired DNA units in sequence using the same DNA construct.

Applicants respectfully submit that, in view of the amendments to claim 4, the foregoing rejection has been rendered moot. Accordingly, Applicants respectfully request that this rejection of claim 4 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

With respect to claim 5, the Examiner is of the opinion that “[t]here is insufficient antecedent basis for [the] limitation [“any one of claims 1 to 3”]...because claim 2 has been canceled.” The Examiner is further of the opinion that “[t]here is insufficient antecedent basis for [the] limitation [“the DNA modification enzyme”]...because there is no phrase “DNA modification enzyme in claims 1 and 3.”

Applicants respectfully submit that, in view of the amendments to claim 5, the foregoing rejections have been rendered moot. Accordingly, Applicants respectfully request that these rejections of claim 5 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

With respect to claims 6 and 7, the Examiner is of the opinion that

[c]laim 6 or 7 recites the limitation “any one of claims 1 to 4” in the claims. There is insufficient antecedent basis for this limitation in the claim because claim 2 has been canceled.

Applicants respectfully submit that, in view of the amendments to claims 6 and 7, the foregoing rejections have been rendered moot. Accordingly, Applicants respectfully request that these rejections of claims 6 and 7 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

With respect to claims 9 and 10, the Examiner is of the opinion that

[s]ince, in view of steps c) to e), the starting DNA constructs used for ligating each desired DNA unit in step e) must be different while step c) requires to use the same DNA construct for ligating each desired DNA unit, it is unclear how to assemble the DNA units in sequence using the same DNA construct.

Applicants respectfully submit that, in view of the amendments to claims 9 and 10, the foregoing rejections have been rendered moot. Accordingly, Applicants respectfully request that

these rejections of claims 9 and 10 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

With respect to claim 9, the Examiner is further of the opinion that

[c]laim 9 recites the limitation “the recognition site for the first restriction enzyme at the ligation junction” in step c) of the claim. There is insufficient antecedent basis for this limitation in the claim because there is no phrase “the recognition site for the first restriction enzyme at the ligation junction” in steps a) and b) of the claim.

Applicants respectfully submit that, in view of the amendments to claim 9, the foregoing rejections have been rendered moot. Accordingly, Applicants respectfully request that these rejections of claim 9 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

The Examiner is further of the opinion that claim 9 is “vague and indefinite” because “[i]t is unclear that the product from step c) in step d) is the ligated product from step c) or cleaved ligated product from step c).”

Applicants respectfully submit that, in view of the amendments to claim 9, the foregoing rejections have been rendered moot. Accordingly, Applicants respectfully request that this rejection of claim 9 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

The Examiner is further of the opinion that claim 10 is “vague and indefinite” because “[i]t is unclear that the cleaved first desired DNA unit generated in step b) is a cleaved first desired DNA unit from step b) or a cleaved and dephosphorylated first desired DNA unit from step b).

Applicants respectfully submit that, in view of the amendments to claim 10, the foregoing rejections have been rendered moot. Accordingly, Applicants respectfully request that

this rejection of claim 10 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

The Examiner is further of the opinion that claim 10 is “vague and indefinite” because “[i]t is unclear that the product from step c) in step d) is the ligated product in step c) or the cleaved ligated product in step c).”

Applicants respectfully submit that, in view of the amendments to claim 10, the foregoing rejections have been rendered moot. Accordingly, Applicants respectfully request that this rejection of claim 10 under 35 U.S.C. §112, second paragraph, be reconsidered and withdrawn.

**SUMMARY**

In view of the above amendments, Applicants believe that the present application is in condition for allowance. If a telephone conversation with Applicants' Attorney would expedite the prosecution of the above-identified application, the Examiner is urged to call the undersigned at (617) 227-7400.

Applicants believe that no fee is due with this communication. However, if a fee is due, please charge our Deposit Account No. 12-0080, under Order No. SHW-009US from which the undersigned is authorized to draw.

Dated: July 30, 2007

Respectfully submitted,

By 

Maria Laccotripe Zacharakis, Ph.D., J.D.

Registration No.: 56,266

LAHIVE & COCKFIELD, LLP

One Post Office Square

Boston, Massachusetts 02109-2127

(617) 227-7400

(617) 742-4214 (Fax)

Attorney/Agent For Applicants